

PATENT ABSTRACTS OF JAPAN

(11) Publication number : 2002-135373
 (43) Date of publication of application : 10.05.2002

(51) Int.CI.

H04M 1/00
 G03B 19/02
 H04N 5/222
 H04N 5/225
 H04N 5/76
 H04N 5/907
 H04N 5/91
 H04N 5/765
 H04N 7/18
 // H04N101:00

(21) Application number : 2000-322694

(71) Applicant : HAPPO MASAHIRO
 TAKEDA KENTARO
 NAMITA YOSHIYUKI

(22) Date of filing : 23.10.2000

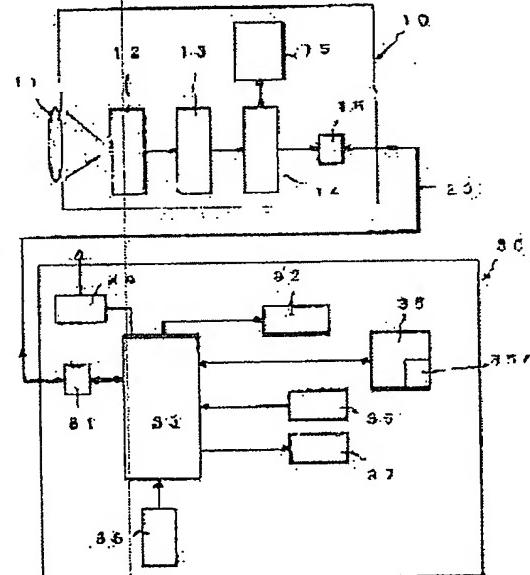
(72) Inventor : HAPPO MASAHIRO
 TAKEDA KENTARO
 NAMITA YOSHIYUKI

(54) METHOD FOR HANDLING DIGITAL CAMERA IMAGE AND SIMPLE DIGITAL CAMERA ADOPTING THIS METHOD, AND MULTIMEDIA TERMINAL

(57) Abstract:

PROBLEM TO BE SOLVED: To provide a method for handling an image of a digital camera, which minimizes a function section of the digital camera so as to provide the digital camera at a low cost and which can easily monitor an image.

SOLUTION: A simple digital camera 10 having a photoelectric sensor 12, a built-in memory 15 and an external interface 16 is connected to a mobile phone 30 via a signal cable 20, a display device 32 of the mobile phone 30 is used for a monitor screen at photographing with the simple digital camera 10 or a display screen after photographing, and a photographed image with the simple digital camera 10 is used for a background image of the display device of the mobile phone 30.

**LEGAL STATUS**

[Date of request for examination]

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than

the examiner's decision of rejection or
application converted registration]
[Date of final disposal for application]
[Patent number]
[Date of registration]
[Number of appeal against examiner's decision
of rejection]
[Date of requesting appeal against examiner's
decision of rejection]
[Date of extinction of right]
* NOTICES *

JPO and INPI are not responsible for any
damages caused by the use of this translation.

1. This document has been translated by computer. So the translation may not reflect the original precisely.
2. **** shows the word which can not be translated.
3. In the drawings, any words are not translated.

CLAIMS

[Claim(s)]

[Claim 1] The digital camera image handling approach characterized by connecting to the
***** ON terminal of a cellular phone with a display the signal cable connected to said
external instrument connection terminal of the simple digital camera which has the
photoelectrical sensor more than tens of thousands of pixel number, an internal memory, and the
external instrument connection terminal of the ** sake which incorporates a picture signal to a
cellular phone, and using the display of said cellular phone as the display screen after the time of
photography of said simple digital camera, or photography.

[Claim 2] It is the digital camera image handling approach characterized by being the digital
camera image handling approach according to claim 1, and said photoelectrical sensor having the
number of pixels of at least 100,000 pixels or more.

[Claim 3] The picture signal which is the digital camera image handling approach according to
claim 1 or 2, and was incorporated by said cellular phone is the digital camera image handling
approach characterized by the ability of the display of said cellular phone to display an image
independently of said simple digital camera based on said picture signal at the storage of said
cellular phone.

[Claim 4] The picture signal which is the digital camera image handling approach according to
claim 3, and was incorporated by said cellular phone is the digital camera image handling
approach characterized by being overwritten additionally at the background-image storage of
said cellular phone, and being used as a background image of the display of said cellular phone.

[Claim 5] The picture signal which it is the digital camera image handling approach according to
claim 1 to 4, and said simple digital camera is a gestalt which does not have a memory-clear
means, and was memorized by the internal memory of said simple digital camera is the digital
camera image handling approach characterized by being eliminated by the store installation mold
multimedia terminal machine.

[Claim 6] It is the digital camera image handling approach characterized by being the digital
camera image handling approach according to claim 1 to 5, and for said multimedia terminal
machine incorporating the picture signal memorized by said simple digital camera or said cellular
phone, and performing processing and signal processing which corrects or adds additional
information, such as an alphabetic character and voice, for said picture signal.

[Claim 7] The processed picture signal which was the digital camera image handling approach according to claim 5 or 6, and signal processing was carried out and was acquired by said multimedia terminal machine is the digital camera image handling approach characterized by the ability to save at the internal memory of said simple digital camera, and/or the storage of said cellular phone, or save at the attachment-and-detachment type external record medium contained by said multimedia terminal machine free [ejection], and purchase said processed picture signal.

[Claim 8] A picture signal [finishing / processing / the signal-processing front stirrup which is the digital camera image handling approach according to claim 5 or 6, and was incorporated by said multimedia terminal machine] is the digital camera image handling approach characterized by keeping it to a server through the internal memory of a simple digital camera, the storage of said cellular phone, or said attachment-and-detachment type external record medium to the Internet from said multimedia terminal machine.

[Claim 9] It is the digital camera image handling approach which is the digital camera image handling approach according to claim 5 or 6, and is characterized by the ability for said multimedia terminal machine to print out a processed picture signal, and sell it as a photograph.

[Claim 10] The simple digital camera which is a simple digital camera used for the digital camera image handling approach according to claim 1 to 9, and is characterized by having an external instrument connection terminal for incorporating the photoelectrical sensor, internal memory, and picture signal more than tens of thousands of pixel number to a cellular phone.

[Claim 11] It is the simple digital camera characterized by being a simple digital camera according to claim 10, and said photoelectrical sensor having the number of pixels of 100,000 pixels or more.

[Claim 12] The simple digital camera which is a simple digital camera according to claim 10 or 11, and is characterized by not having the memory-clear means of said internal memory.

[Claim 13] The simple digital camera which is a simple digital camera according to claim 10 to 12, and is characterized by including as a set the signal cable which should be connected to said cellular phone through said interface.

[Claim 14] The input terminal which is the store installation mold multimedia terminal machine used for the digital camera image handling approach according to claim 5 to 9, and adopts a picture signal from said simple digital camera or a cellular phone. A memory-clear means to eliminate the data of the internal memory of said simple digital camera, A signal processing correction means to process said adopted picture signal and to correct, An information addition means to add information, such as an alphabetic character and voice, to said picture signal, and said picture signal process it. A picture signal output means to output the processed picture signal after being corrected or adding information, and to save in the internal memory of said simple digital camera, or the memory of a cellular phone, or to save at an attachment-and-detachment type external record medium, and to output said processed picture signal. The store installation mold multimedia terminal machine characterized by having any one or two or more means of the Internet communication facility section which keeps the picture signal before said processing settled or processing to a server through the Internet, and the printing section which prints said picture signal and is outputted as a photograph.

[Translation done.]

* NOTICES *

JPO and INPI are not responsible for any damages caused by the use of this translation.

1. This document has been translated by computer. So the translation may not reflect the original precisely.

2. **** shows the word which can not be translated.

3.In the drawings, any words are not translated.

DETAILED DESCRIPTION

[Detailed Description of the Invention]

[0001]

[Field of the Invention] This invention relates to a suitable simple digital camera to be used for this image handling approach, concerning the image handling approach of a digital camera of not having a display.

[0002]

[Description of the Prior Art] Since it does not usually have the screen-display sections, such as a liquid crystal display, in order for the digital camera of the low price whose number of pixels is not so high to have spread, to restrict photography number of sheets since this is memory built-in, and to maintain a low price recently, a photography screen cannot be immediately checked after photography like the expensive digital camera of a display loading mold.

[0003] Image data without the need of judging the remaining memory capacity of a digital camera having decreased, and saving in the memory of the digital camera like an old image among the picture signal [finishing / photography] is chosen, the storage substitute of this is carried out with a data transmission unit at other devices, and the approach which enabled it to photo a digital camera successingly is proposed (refer to JP,10-304231,A). However, this needs an image transmitting means, an image selection means, etc. for a digital camera, and has the fault from which a digital camera becomes expensive.

[0004] Moreover, the equipment which transmitted the picture signal which possessed the memory and the image pick-up means of having the storage capacity for one screen in a cellular phone, and signal-processing means, such as an A/D-conversion machine, and the cellular phone picturized to the remote place through the digital channel is proposed (refer to JP,6-233020,A). This equipment was equipment with which the digital camera and the cellular phone were united, and weight and a configuration became large and it had the fault from which the function as a cellular phone is prevented.

[0005] Furthermore, the set goods of the digital camera of the trade name of a trademark "RAPOSSHIE" and the correspondence cellular phone of the trade name of a trademark "Kiaro" are put on the market from the so-called Tu-Ka cellular phone group recently. This aims at connecting a digital camera and a cellular phone by the exclusive digital cable, choosing the image photoed with the digital camera, choosing a transmitting partner with a cellular phone, and carrying out e-mail transmission of the image.

[0006] The digital camera of these set goods is difficult to build in a display and mass memory, to be digital camera goods perfect at itself, and to hold down a price low except for a transmitting function. Moreover, since it had the display in both the digital camera and the cellular phone and each display has achieved the function to each, it has the fault which serves as a large sum comparatively also as set goods.

[0007] On the other hand, the display object and other images of the alphabetic character which the background image (screen) called the so-called wallpaper to the control panel of a display is displayed, and should be displayed on a display, a notation, and others are displayed by the latest cellular phone on this wallpaper like DISUPUIRE of a computer. However, displaying the always same background image on a control panel makes a user lose the freshness of a self cellular phone, and it cannot respond to the need of the user who always asks for change. For this reason, recording some background images on a background-image record medium, calling these to a control panel alternatively, and giving freshness to a cellular phone is performed (for example, refer to JP,8-83155,A). However, this can only choose the limited background image only created by the manufacturer side, and had the fault which cannot display a user's favorite image on a control panel.

[0008]

[Problem(s) to be Solved by the Invention] Although one technical problem which this invention

tends to solve can control the function part of a digital camera to the minimum and can offer a digital camera by the low price, it is to offer the digital camera image handling approach which can carry out monitoring of the image easily.

[0009] Although other technical problems which this invention tends to solve can control the function part of a digital camera to the minimum and can offer a digital camera by the low price, they are to offer the digital camera image handling approach which can take out an image [finishing / photography] easily and can take a photograph succeedingly.

[0010] Other technical problems which this invention tends to solve are to offer the digital camera image handling approach that a user's favorite image can be used for the control panel of the display of a cellular phone as a background image.

[0011] The technical problem of further others which this invention tends to solve is to offer the simple digital camera which can control the function part of a digital camera to the minimum, and can be offered by the low price, without needing the display of an image, and the internal memory of a big capacity.

[0012]

[Means for Solving the Problem] The 1st fundamental technical-problem solution means of this invention connects to the ***** ON terminal of a cellular phone with a display the signal cable connected to the external instrument connection terminal of the simple digital camera which has an external instrument connection terminal for incorporating the photoelectrical sensor, the internal memory, and the picture signal more than tens of thousands of pixel number to a cellular phone, and is to offer the digital camera image handling approach characterized by to use the display of a cellular phone as the display screen after the time of photography of a simple digital camera, or photography.

[0013] In the picture signal incorporated by the cellular phone, the display of a cellular phone can display an image on the storage of a cellular phone independently of a simple digital camera based on a picture signal.

[0014] Moreover, the picture signal incorporated by the cellular phone can be overwritten additionally at the background-image storage of a cellular phone, and this can be used as a background image of the display of a cellular phone.

[0015] When a simple digital camera is the gestalt which does not have a memory-clear means, the picture signal memorized by the internal memory of a simple digital camera can be eliminated by the store installation mold multimedia terminal machine.

[0016] A multimedia terminal machine can incorporate the picture signal memorized by the simple digital camera or the cellular phone, and can perform processing and signal processing which corrects or adds additional information, such as an alphabetic character and voice, for a picture signal.

[0017] The processed picture signal which signal processing was carried out and was acquired by the multimedia terminal machine can be saved at the internal memory of a simple digital camera, can be saved at the storage of a cellular phone, or can be saved at the attachment-and-detachment type external record medium contained by the multimedia terminal machine free [ejection], and can purchase a processed picture signal.

[0018] Through a multimedia terminal machine to the direct Internet, it can be kept to a server, or a picture signal [finishing / processing / the processing front stirrup incorporated by the multimedia terminal machine] can be moved to the storage of the internal memory of a simple digital camera to a cellular phone, or can be kept [*** / keeping it to a server] to a server through the Internet through a cellular phone to the Internet from the computer which contained the attachment-and-detachment type external record medium.

[0019] As for a multimedia terminal machine, it is desirable to print out a processed picture signal and to enable it to purchase as a photograph.

[0020] The 2nd fundamental technical-problem solution means of this invention is a simple digital camera used for the approach by the 1st technical-problem solution means, and is to offer the simple digital camera characterized by having an external instrument connection terminal for incorporating the photoelectrical sensor, internal memory, and picture signal more than tens of thousands of pixel number to a cellular phone.

[0021] This simple digital camera can contain as a set the signal cable which shall not have the memory-clear means of an internal memory, and should be connected to a cellular phone through an interface.

[0022] Thus, if the signal cable connected to the external interface of a simple digital camera is connected to the external signal introduction port of a cellular phone with a display and the display of a cellular phone is used as the display screen after the time of photography of a simple digital camera, or photography, since the display of a cellular phone will serve as the display of a digital camera, the structure of a digital camera can be simplified as much as possible, and it can hold down to a low price.

[0023] Moreover, if the picture signal from a digital camera is memorized by additional or overwrite to the background-image record medium of a cellular phone, since the image of a digital camera can be used as wallpaper of the display of a cellular phone, freshness can be given to the wallpaper of a cellular phone or a self favorite image can be used for the display of a cellular phone as wallpaper.

[0024] While the younger age group catches a self-portrait and other images to a digital camera, incorporates this to a cellular phone and shows a third person these images through the Internet, an E-mail, etc., informational transfer and exchange can be performed.

[0025] Furthermore, if the storage information on an internal memory is eliminable using the multimedia terminal machine of the store installation mold of a franchise format Since a memory-clear means is not needed for a digital camera and it can be continuously used by being able to offer a digital camera upwards by the low price further, and eliminating memory ** is the same as carrying out reuse of the disposable mold camera, and although image quality is not high, it can give a camera function to a cellular phone and can improve the added value of a cellular phone.

[0026] The multimedia terminal machine of a store installation mold incorporates the picture signal memorized by the simple digital camera or the cellular phone, and processes a picture signal. The processed picture signal which could perform signal processing which corrects or adds additional information, such as an alphabetic character and voice, and did in this way, and signal processing was carried out, and was acquired Since it can save at the internal memory of a simple digital camera, it can save at the storage of a cellular phone, or it can save at the attachment-and-detachment type external record medium contained by the multimedia terminal machine free [ejection] and a processed picture signal can be purchased, added value can be given to an image.

[0027] A picture signal [finishing / processing / the processing front stirrup incorporated by the multimedia terminal machine] The direct Internet is minded from a multimedia terminal machine. Keep it to a server or It moves from the internal memory of a simple digital camera to the storage of a cellular phone, or the Internet is minded from a cellular phone. Keep it to a server or If it can be kept to a server through the Internet from the computer which contained the attachment-and-detachment type external record medium and a multimedia terminal machine can print out a processed picture signal It can purchase as a photograph, and further, in case information is transmitted or exchanged through the Internet or an E-mail, additional information can be given to an image and signal transduction and information interchange can be performed much more effectively.

[0028]

[Embodiment of the Invention] When the gestalt of operation of this invention is stated to a detail with reference to a drawing, drawing 1 The simple digital camera 10 which shows systematically the digital camera image handling approach of this invention, and is used for this invention The photoelectrical sensor 12 more than tens of thousands of pixel numbers, such as CCD, CMOS, etc. which carry out image formation of the light from a lens 11, and carry out photo electric conversion, A/D converter 13 which carries out A/D conversion of the picture signal from this photoelectrical sensor 12. The control section 14 including the picture compression means which carries out compression processing of the digital output of this A/D converter 13. It has the external instrument connection terminal 16 including the internal memory 15 which memorizes the picture signal compressed from this control section 14, and the

interface for incorporating this picture signal to the cellular phone 30 with a display.

[0029] Although about tens of thousands of pixels are sufficient as an internal memory 15, it is the purpose which holds down the price of a camera as much as possible, and makes an image as clear as possible, and 10 thru/or about hundreds of thousands of pixels are desirable. When, photographizing an image or albumizing although it is enough also before and after a 100,000-pixel number when setting it as the main purpose to use as wallpaper (background image) of a cellular phone so that it may state later, it is desirable to have the number of pixels beyond 300,000 order or it. [observing on a display the image photoed with the digital camera]

[0030] If the photography number of sheets of a simple digital camera avoids at least, a control section 14 does not need to include a picture compression means, and although the picture compression means of a control section 14 is required at the internal memory 15 of predetermined capacity to make [many] photography number of sheets, it is desirable [a control section / this] when manufacturing the simple digital camera 10 by the low price.

[0031] Although the simple digital camera 10 used for this invention may be equipped with a memory-clear means to eliminate the picture signal currently recorded on the internal memory 15, in order to control the price of a camera, it is desirable not to have the memory-clear means. Therefore, although photography beyond it cannot be performed if the remaining capacity of an internal memory 15 is lost, this is eliminable by the approach described later.

[0032] As shown in drawing 1, one description of the digital camera image handling approach of this invention connects to the ***** ON terminal (or port) 31 of the cellular phone 30 with a display the signal cable 20 connected to the external instrument connection terminal 16 of this simple digital camera 10, and is to use the display 32 of a cellular phone 30 as the display screen after the time of photography of the simple digital camera 10, or photography.

[0033] The control section 33 which the cellular phone 30 equipped with the transceiver function and the signal-processing function as shown in drawing 1, The data-communication-facility section 34 which transmits various information signals, such as an image, an alphabetic character, and voice, from this control section 33, or receives to a control section 33, The record medium 35 which memorizes these information signals, and the microphone 36 and loudspeaker 37 which generate a sound signal among an information signal, or are reproduced. In order to perform various data communication facility of a cellular phone, it has the carbon button which inputs an information signal, an actuation signal, a control signal, etc., and/or the input section 38 of the gestalt of a jog.

[0034] A display 32 has a picture signal and the display function which displays alphabetic signal ***** among the information signal supplied from a control section 33. The background image with which the storage 35 is memorized by this background-image storage 35A including background-image storage 35A which memorizes the background image of the control panel of a display 32 is displayed as wallpaper on the control panel of a display 32. Although one or some background images are memorizable to background-image storage 35A, this can also memorize a separate background image through the data-communication-facility section 34.

[0035] Other descriptions of the approach of this invention are to use the image photoed with the simple digital camera 10 as an alternative background image of the control panel of the display 32 of a cellular phone 30. This can be attained by overwriting and saving the picture signal of the simple digital camera 10 additionally, through a signal cable 20, at background-image record-medium 35A of a cellular phone 30. The background image in background-image record-medium 35A can be chosen by operating the input section 38.

[0036] The description of further others of this invention is for it to be eliminable with the **** store installation mold multimedia terminal machine 40 which shows the picture signal memorized by the internal memory 15 of the simple digital camera 10 to drawing 2. when the simple digital camera 10 is the gestalt which does not have a memory-clear means. The multimedia terminal machine 40 can perform various processings besides a clear memory function so that it may state later.

[0037] This multimedia terminal machine 40 is equipped with the control section 41 like CPU which controls various processings, and a memory-clear means 42 to eliminate the storage information on the internal memory 15 of the simple digital camera 10 is connected to the simple

digital camera 10 through this control section 41.

[0038] The multimedia terminal machine 40 is equipped with an information addition means 44 to add additional information, such as an alphabetic character and voice, to the signal processing correction means 43 and picture signal which incorporate further the picture signal memorized by the simple digital camera 10 or the cellular phone 30, and process and correct a picture signal, and these signal processing correction means 43 and the information addition means 44 are also connected to the control section 41.

[0039] The processed picture signal acquired by carrying out signal processing of this multimedia terminal machine 40 in this way is outputted. Moreover, save at the internal memory 15 of the simple digital camera 10, or It can have a picture signal output means 46 to save at the storage 35 of a cellular phone 30, or to save at the attachment-and-detachment type external record medium 45 contained by the multimedia terminal machine 40 free [ejection], and to sell a processed picture signal. This picture signal output means 46 is connected between the input terminals later described as a control section 41.

[0040] Furthermore, the multimedia terminal machine 40 can be equipped with the printing section 48 which the Internet communication facility section 47 and a processing front stirrup can print out a picture signal [finishing / processing], and can be sold as a photograph in order for a processing front stirrup to keep a picture signal [finishing / processing] to a server through the direct Internet.

[0041] Since the simple digital camera 10 does not have the memory of an attachment-and-detachment type, and since the cellular phone 30 which receives data from this simple digital camera does not usually have the memory of an attachment-and-detachment type, either, it has the input terminal 49 which connects the multimedia terminal machine 40 through the simple digital camera 10, or a cellular phone 30 and a signal cable, and receives data.

[0042] The multimedia terminal machine 40 is equipped with the price collection means 50 for receiving the countervalue of sale (signal-processing service) of the picture signal processed [memory-clear service and], or sale (print service) of a photograph. This can be made into a card system price collection means to collect through the cash handling type price collection means and/or credit card with which the display window, coin, and bill of service price include a ***** slot etc., or a debit card into a slot.

[0043] Next, although proper photographic subjects, such as a complete view of the natural scenery which went into the mind of a travel place using the simple digital camera 10, and a house, their face, or the upper half of the body, will be photoed if order is described for the approach of this invention later on The simple digital camera 10 and a cellular phone 30 are connected with a signal cable 20 with a signal cable 20 in that case. It considers as the condition that the picture signal of the simple digital camera 10 can be incorporated to a cellular phone 30, and the display 32 of a cellular phone 30 is made into operating state, and the screen of this display 32 is used as a monitoring screen and a display screen.

[0044] On the other hand, since the picture signal incorporated by the cellular phone 30 from the simple digital camera 10 is memorizable to the storage 35 of a cellular phone 30, the display 32 of a cellular phone 30 can display an image based on a picture signal independently of the simple digital camera 10.

[0045] Moreover, the picture signal incorporated by the cellular phone 30 can be overwritten additionally at background-image storage 35A of a cellular phone 30, therefore the image from the simple digital camera 10 saved by doing in this way can be used as a background image of the display 32 of a cellular phone 30.

[0046] When the simple digital camera 10 is the gestalt which does not have a memory-clear means, the simple digital camera 10 can be brought at the store in which the multimedia terminal machine 40 is installed, the simple digital camera 10 can be connected to the multimedia terminal machine 40 through a signal cable 30, and the picture signal memorized by the internal memory 15 can be eliminated using the memory-clear means 42 of the multimedia terminal machine 40. Therefore, since an internal memory 15 becomes empty again, it can continue and use the simple digital camera 10.

[0047] Since the multimedia terminal machine 40 has the signal processing correction means 43

and the information addition means 44, it can incorporate the picture signal which connects the simple digital camera 10 or a cellular phone 30 to the multimedia terminal machine 40 through a signal cable, and is memorized by these, and can perform processing and signal processing which corrects or adds additional information, such as an alphabetic character and voice, for a picture signal.

[0048] Since the multimedia terminal machine 40 has the Internet communication facility section 47, the picture signal incorporated from the simple digital camera 10 or the cellular phone 30 can keep it to a server through the Internet, remaining as it is or after adding processing correction or additional information.

[0049] Moreover, since this multimedia terminal machine 40 can output a processed picture signal, and it can save at the internal memory 15 of the simple digital camera 10, it can save at the storage 35 of a cellular phone 30, or it can save it at the attachment-and-detachment type external record medium 45 contained by the multimedia terminal machine 40 free [ejection] and a processed picture signal can be purchased, a picture signal can give added value to a picture signal in response to the processing which neither the simple digital camera 10 nor the cellular phone 30 has.

[0050] Since the picture signal processed with the multimedia terminal machine 40 can be returned to the internal memory 15 of the simple digital camera 10, or the storage 35 of a cellular phone 30 or can be kept and purchased to an attachment-and-detachment type external record medium, through a cellular phone to the Internet, it can be kept to a server or it can keep this processed picture signal to a server through the Internet from the computer which contained the attachment-and-detachment type external record medium.

[0051] Recently, the spread of cellular phones is remarkable and those who own the cellular phone even if it does not own the computer are imagined [more] than those who own only one side. It is rare to, have the function to process the picture signal acquired by photography, on the other hand, although the spread of digital cameras is also remarkable recently and the digital camera is equipped with the photography function, and, usually this is rather left to a computer.

[0052] If the approach of this invention is used Display functions and need, such as a display, are accepted. A clear memory function The function which the digital camera does not have combining the simple digital camera 10 which can lose, can be made to be able to hold only a necessary minimum function and can be offered by the low price, and the cellular phone 30 usually owned in many cases is made to share with a cellular phone. Moreover, the photography image of the simple digital camera 10 can be used as a background image (wallpaper) of the display of a cellular phone 30 with this combination.

[0053]

[Effect of the Invention] Since according to this invention the signal cable connected to the external instrument connection terminal of a simple digital camera is connected to the ***** ON terminal of a cellular phone with a display as mentioned above and the display of a cellular phone is made into the monitoring screen at the time of photography of a simple digital camera, or the display screen after photography, the display of a cellular phone can serve as the display of a digital camera, the structure of a digital camera can be simplified as much as possible, and it can hold down to a low price.

[0054] Moreover, since the picture signal from a digital camera is memorizable by additional or overwrite to the background-image record medium of a cellular phone, the image of a digital camera can be used as wallpaper of the display of a cellular phone, freshness can be given to the wallpaper of a cellular phone or a self favorite image can be used for the display of a cellular phone as wallpaper.

[0055] Since informational transfer and exchange can be performed while the younger age group catches a self-portrait and other images to a digital camera, incorporates this to a cellular phone and shows a third person these images through the Internet, an E-mail, etc. especially, the photography image of a digital camera can be effectively used using the communication facility of a cellular phone.

[0056] Furthermore, since the storage information on an internal memory is eliminable using the multimedia terminal machine of the store installation mold of a franchise format Since a

memory-clear means is not needed for a digital camera and it can be continuously used by being able to offer a digital camera upwards by the low price further, and eliminating memory it is the same as carrying out reuse of the disposable mold camera, and * can also give a camera function to a cellular phone and can improve the added value of a cellular phone.

[0057] The multimedia terminal machine of a store installation mold incorporates the picture signal memorized by the simple digital camera or the cellular phone, and processes a picture signal. The processed picture signal which could perform signal processing which corrects or adds additional information, such as an alphabetic character and voice, and did in this way, and signal processing was carried out, and was acquired Since it can save at the internal memory of a simple digital camera, it can save at the storage of a cellular phone, or it can save at the attachment-and-detachment type external record medium contained by the multimedia terminal machine free [ejection] and a processed picture signal can be purchased, added value can be given to an image.

[0058] A picture signal [finishing / processing / a processing front stirrup] minds the direct Internet from a multimedia terminal machine. Keep it to a server or It moves from the internal memory of a simple digital camera to the storage of a cellular phone, or the Internet is minded from a cellular phone. Keep it to a server or It can be kept to a server through the Internet from the computer which contained the attachment-and-detachment type external record medium. Moreover, it can print in the printing section of a multimedia terminal machine, and can purchase as a photograph, and further, in case information is transmitted or exchanged through the Internet or an E-mail, additional information can be given to an image and signal transduction and information interchange can be performed much more effectively.

[0059] Therefore, the image which has high added value can be obtained upwards only by according to this invention, connecting a simple digital camera to the cellular phone usually owned in many cases, even if it does not own the computer, the wallpaper function of a cellular phone is improved, and there is utility which can attain especially such effectiveness while controlling the price of a simple digital camera.

[Translation done.]

* NOTICES *

JPO and INPI are not responsible for any damages caused by the use of this translation.

1. This document has been translated by computer. So the translation may not reflect the original precisely.
2. *** shows the word which can not be translated.
3. In the drawings, any words are not translated.

DESCRIPTION OF DRAWINGS

[Brief Description of the Drawings]

[Drawing 1] It is the block diagram showing systematically the digital camera image handling approach of this invention.

[Drawing 2] It is the outline block diagram of the multimedia terminal machine used for the digital camera image handling approach of this invention.

[Description of Notations]

10 Simple Digital Camera

11 Lens

12 Photoelectrical Sensor

13 A/D Converter

14 Control Section
15 Internal Memory
16 Interface
20 Signal Cable
30 Cellular Phone with Display
31 External Signal Introduction Port
32 Display
33 Control Section
34 Data-Communication-Facility Section
35 Record Medium
35A Background-image record medium
36 Microphone
37 Loudspeaker
38 Input Section
40 Store Installation Mold Multimedia Terminal Machine
41 Control Section
42 Memory-Clear Means
43 Signal Processing Correction Means
44 Information Addition Means
45 Attachment-and-Detachment Type External Record Medium
46 Picture Signal Output Means
47 Internet Communication Facility Section
48 Printing Section
49 Input Port

[Translation done.]

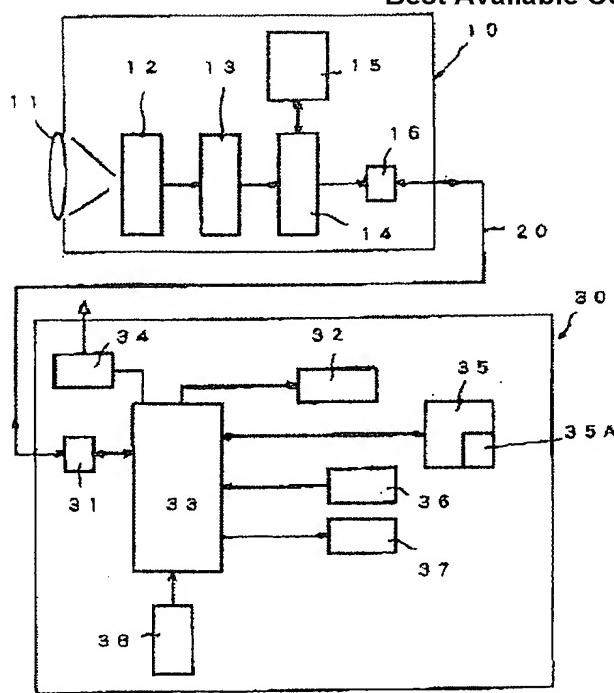
* NOTICES *

JPO and INPIT are not responsible for any damages caused by the use of this translation.

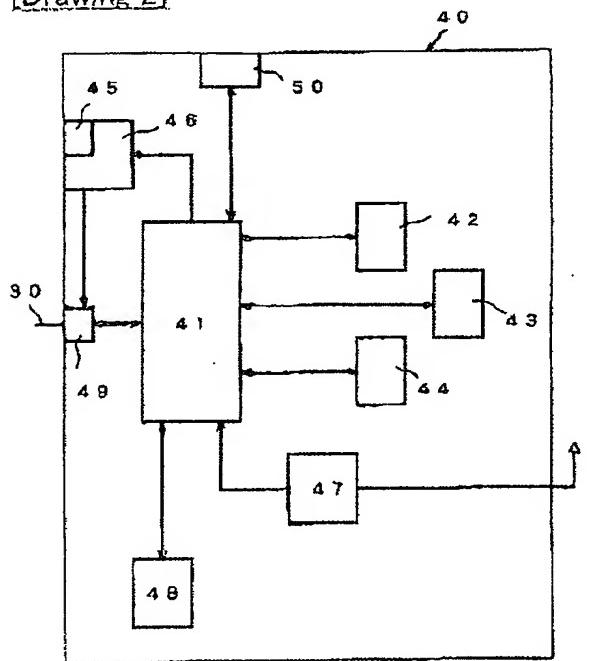
1. This document has been translated by computer. So the translation may not reflect the original precisely.
2. **** shows the word which can not be translated.
3. In the drawings, any words are not translated.

DRAWINGS

[Drawing 1]



[Drawing 2]



[Translation done.]

**This Page is Inserted by IFW Indexing and Scanning
Operations and is not part of the Official Record**

BEST AVAILABLE IMAGES

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images include but are not limited to the items checked:

- BLACK BORDERS**
- IMAGE CUT OFF AT TOP, BOTTOM OR SIDES**
- FADED TEXT OR DRAWING**
- BLURRED OR ILLEGIBLE TEXT OR DRAWING**
- SKEWED/SLANTED IMAGES**
- COLOR OR BLACK AND WHITE PHOTOGRAPHS**
- GRAY SCALE DOCUMENTS**
- LINES OR MARKS ON ORIGINAL DOCUMENT**
- REFERENCE(S) OR EXHIBIT(S) SUBMITTED ARE POOR QUALITY**
- OTHER:**

IMAGES ARE BEST AVAILABLE COPY.

As rescanning these documents will not correct the image problems checked, please do not report these problems to the IFW Image Problem Mailbox.